Hydrocarbons
By: Ian Miller and Mark Dietrich

Largest Bond?

- Triple Bond- Alkyne. (has no cyclos in Bio-Chem Class)
  - Count the longest carbon chain to find the appropriate prefix, the suffix will be -yne
    - Does it have branches
      - Yes: Name the branches with a prefix followed by -yl → Number the branches and name then appropriately → You're finished
      - No: Name it with the prefix followed by -yne → You're finished
- Double Bond- Alkene
  - Is it in a ring formation
    - Yes: Name it as Cyclo → Count how many carbons are in the cycloalkene → Does it have branches
      - Yes: Name it cyclo-prefix-ene → You're finished
      - No: Name it with the appropriate branches → You're finished
    - No: There isn't a Cyclo in it → Count the longest chain of carbon to find your prefix followed by -ane → The double bond needs to be on the lowest carbon number → Then name it appropriately → You're finished
  - Does it have Cis or Trans
    - Yes: Name it a appropriately
      - Cis: has same side carbons
      - Trans: has opposite side carbons
    - No: Go on naming it
- Single Bond- Alkane
  - Is it in a ring formation
    - No: There isn't a cyclo → Count longest chain of carbon to find your prefix followed by -ane → Does it have branches?
      - Yes: Name the branch with the appropriate prefix followed by -yl. then add your alkane name → You're finished
      - No: You're finished
    - Yes: Name it with Cyclo → Count longest chain of carbon to find your Cyclo prefix followed by -ane → Does it have branches?
      - No: You're Finished
      - Yes: Name the branch with the appropriate prefix followed by -yl then add your cyclo alkane name → You're Finished